CASE

OF

EXCISION OF THE LOWER JAW,

IN WHICH BOTH LATERAL PORTIONS OF THE BONE HAVE BEEN REMOVED, LEAVING MERELY A SMALL PORTION AT THE SYMPHYSIS.

By JAMES SPENCE, Surgeon,

Member of the Medico-Chirurgical and Anatomical Societies of Edinburgh, and one of the Teachers in the School of Anatomy, No. 1, Surgeon's Square.

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My principal reason for publishing the following case is, that it is the only one, as far as I am aware, in which both lateral portions of the inferior maxilla have been removed, leaving merely the symphysis of the bone remaining, and hence I considered it might be interesting to the profession.

The first operation on the patient whose case is the subject of the communication, was performed by Mr Fergusson in 1836; and, through the kindness of that gentleman, I am enabled to commence the history of the case with his report.

"Mrs Fitzpatrick, aged 46, received a blow on the right side of the lower jaw several years ago, and since then various small portions of bone have been discharged from time to time. A tumour has gradually formed on the bone between the angle and the chin, and has since attained the size of a hen's egg, its growth having increased rapidly within the last five months. There is no particular pain in the part, but it now begins to annoy her from its size. On the left side the alveolar processes are somewhat thickened, and the teeth on both sides are very deficient, only a few stumps remaining.

"With the concurrence of Sir George Ballingall, Mr Nasmyth, and others, I removed the tumour on the right side on the 12th of March 1836, having divided the bone behind and a little above the angle, and in front a little anterior to the mental foramen. The wound healed kindly, and a firm cicatrix formed in the mouth between the divided ends of the maxilla. I used occasionally to see this patient afterwards, and observed that the swelling on the other side was gradually increasing. Several sections were made of the part which had been removed, and each surface presented a smooth dense aspect of a homogeneous character throughout. The deposit of new structure had seemingly taken place between the alveoli and the maxillary canal, as the latter part had been pushed downwards until it had reached the external plate of bone on the lower margin of the jaw. There was no soft point in the growth, and nothing to indicate malignancy." Such is Mr Fergusson's history of the patient whilst under his care.

I first examined this patient in August last, at the request of Mr Lawrie, to whom she had applied for advice. She at that time complained of great pain in the remaining portion of the jaw, a little in front of the angle of the bone, and on examination, a hard tumour, about the size of a large walnut, flattened, could be felt situated in front of the angle of the jaw.

Her own history of the disease was similar to that given by Mr Fergusson, except that she stated that a piece of bone had been discharged from the left as well as from the right side of the jaw, and that the tumour for which she now consulted me had existed for about five years before the former operation was performed. As she stated that the tumour was enlarging, that the pain had of late become more violent, and as her health was sinking from the want of rest and continued suffering; and as, judging from the firm feel and previous history of the tumour, it did not seem malignant, I recommended her to have it removed. To this, however, she could not then make up her mind to submit. In the end of September, I was again requested to see her, when the pain had become so violent that she said she would submit to anything that would relieve her. I showed the case to Sir George Ballingall, Professor Syme, and Mr Nasmyth, and these gentlemen coincided with me in recommending an operation. Professor Syme mentioned that the patient had been under his care about ten or eleven years ago for a swelling on the left side of the jaw, resulting from an injury; and some sequestra had been discharged; under these circumstances he considered it would be prudent to lay bare the tumour and saw out a portion, to make sure of its exact nature before proceeding to remove the jaw, as it was possible the swelling might depend upon the presence of an internal sequestrum.

I performed the operation on the 20th of October last, in presence of Sir George Ballingall and several medical friends, and assisted by Drs Handyside, Duncan, and Mr Nasmyth. Entering the bistoury in front of the insertion of the masseter muscle, I transfixed the membrane of the mouth, carried the knife forward along the bone and cut outwards, dividing the prolabium and other soft parts a little to the left of the symphysis, and thus at once formed a flap which laid bare the tumour, and enabled me to apply the saw to it. Having ascertained its nature, and finding that its entire removal was necessary, I made an incision downwards from over the articulation of the jaw, terminating in the external end of the former incision. The semilunar flap so formed was then dissected up, the bone cleared from the soft parts on its inner surface, and sawn in front of the canine tooth. I then depressed the bone so as to enable me to divide the insertion of the temporal muscle, and completed the operation by disarticulating, the lateral portion of the jaw; five arteries were tied, some slips of lint placed in the deep part of the wound, and the edges of the incision were then brought together by some points of interrupted suture, except at one point midway between the ear and chin, which was left open for the ends of the ligatures to hang out.

Every thing proceeded favourably; the external incision healed by the first intention except where the ligatures hung out. The slips of lint were removed from the deep incision on the third, and the patient was sitting up on the ninth day. The last ligature came away on the twelfth day. This ligature had been brought out at the upper part of the incision in front of the ear, and on its separation saliva continued to flow from the opening for some days, but it soon healed under the use of pressure, by means of a compress of lint applied over the fistulous opening.

It may seem at first sight of little use to leave the mere symphysis remaining, as, when deprived of the support of the lateral portions, it was as likely to be retracted along with the tongue as to prevent that occurrence. The reasons which induced me to leave that portion of the bone were, 1*st*, that it would afford a better hold for the gentleman who assisted me, to prevent retraction during the operation; 2*dly*, That when the wound healed it would afford support to the lower lip, and thus in some measure prevent the constant escape of saliva; and that, as it would contract adhesions to the cicatrix, by preserving the attachments of the muscles of the tongue the patient would be enabled to speak and swallow better than if it had been removed; and *lastly*, by preserving somewhat the appearance of the chin, the operation would be followed by less deformity, and the patient rendered more comfortable; whereas, if

the symphysis had been removed, the retraction of the lower part of the face would have been greater, the tongue would have formed adhesion to the fore-part of the lip, and thus from its pendulous position have given rise to a constant and profuse discharge of saliva, as was the case in the patient mentioned by Sir George Ballingall, and speech would necessarily have been very indistinct.

The result of the case has fully justified these conclusions; there has been no violent retraction of the tongue; the patient is able to speak as well as before the operation; she swallows easily, can shut and open the mouth, and protrude and retract the tongue readily. The escape of saliva when sitting up is very trifling, and is gradually becoming less.

A section of the jaw, made by my friend Mr Goodsir, shows the tumour to be of a dense solid structure except in its centre, where soft degeneration was apparently just commencing.

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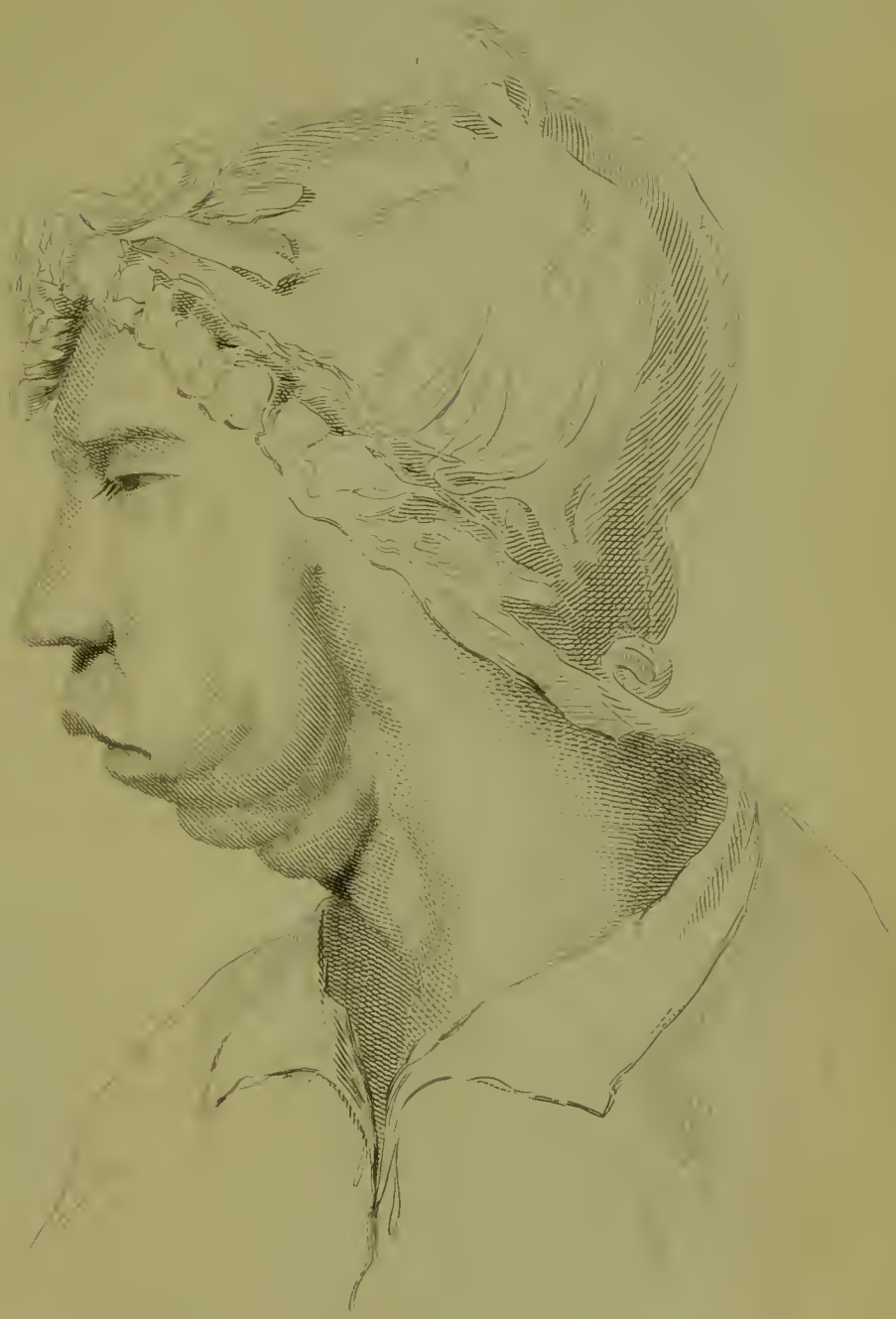

Likeness of M.r Spence's Patient, shewing the extent of retraction of the lower part of face, 3 months after the operation.